

What is claimed is:

1. An exhaust gas purifying method for purifying exhaust gas of an internal combustion engine by an exhaust gas purifying system having an oxidation catalyst, comprising the steps of:

estimating a quantity of a unburnt hydrocarbon accumulated in an oxidation catalyst carrier, raising an exhaust gas temperature by performing a hydrocarbon removal control to activate the oxidation catalyst, and oxidizing and removing the accumulated unburnt hydrocarbon, when the estimated accumulation quantity of the unburnt hydrocarbon exceeds a predetermined judgment value.

2. The exhaust gas purifying method according to claim 1, wherein a judgment is made as to whether an accumulated value of periods in which the internal combustion engine is kept in a low exhaust temperature state becomes a predetermined judgment value or more, instead of judging whether the estimated accumulated quantity of the unburnt hydrocarbon exceeds a predetermined judgment value.

3. The exhaust gas purifying method according to claim 1 or 2, wherein the hydrocarbon removal control raises an exhaust gas temperature by performing multistage fuel injection in the internal combustion engine.

4. The exhaust gas purifying method according to any one of claims 1 to 3, wherein the exhaust gas purifying system has a continuous regenerating diesel particulate filter system.

5. An exhaust gas purifying system having an oxidation catalyst to purify the exhaust gas of an internal combustion engine, comprising an accumulated hydrocarbon quantity judgment means for estimating the quantity of unburnt hydrocarbon accumulated in an oxidation catalyst carrier and judging whether the estimated accumulation quantity of

unburnt hydrocarbon exceeds a predetermined judgment value, and a hydrocarbon removal control means for activating the oxidation catalyst by raising an exhaust gas temperature when the accumulated-hydrocarbon-quantity judgment means judges that the estimated accumulation quantity exceeds the predetermined judgment value, and oxidizing the accumulated unburnt hydrocarbon to remove.

6. The exhaust gas purifying system according to claim 5, wherein the accumulated-hydrocarbon-quantity judgment means judges whether an accumulated value of periods in which the internal combustion engine is kept in a low exhaust temperature state becomes a predetermined judgment value or more, instead of judging whether the estimated accumulation quantity of unburnt hydrocarbon exceeds a predetermined judgment value.

7. The exhaust gas purifying system according to claim 5 or 6, wherein the hydrocarbon removal control means performs the control for raising the exhaust gas temperature by performing multistage fuel injection in the internal combustion engine.

8. The exhaust gas purifying system according to any one of claims 5 to 7, wherein the exhaust gas purifying system has a continuous regenerating diesel particulate filter system.